TENNESSEE GENERAL ASSEMBLY FISCAL REVIEW COMMITTEE



FISCAL NOTE

HB 754 - SB 1427

March 22, 2021

SUMMARY OF BILL: Requires the Department of Education (DOE) to require each local education agency (LEA) serving students in grades nine through twelve (9-12) and public charter high schools to implement a computer science course and content plan by the 2024-25 school year.

Creates the Computer Science Grant Fund (CSG) and the Computer Science Professional Learning Grant Fund (CSPLG) to be administered by DOE. Requires DOE to establish and administer a grant program during the 2021-22, through the 2024-25 school years to provide one-time grants to assist the LEAs and public charter schools with implementing a course and content plan and assist with the development and implementation of high-quality professional learning programs for teachers in kindergarten through grade five (K-5). Establishes certain program reporting requirements for DOE beginning February 15, 2022.

ESTIMATED FISCAL IMPACT:

Increase State Revenue – Exceeds \$4,000,000/FY21-22/CSG and CSPLG Funds

Increase State Expenditures –

Exceeds \$4,000,000/FY21-22/General Fund Exceeds \$1,000,000/Each FY21-22 through FY24-25/ CSG and CSPLG Funds

Increase Local Revenue – Exceeds \$1,000,000/Each FY21-22 through FY24-25

Increase Local Expenditures –

Exceeds \$3,119,900/FY22-23* Exceeds \$6,116,900/FY23-24* Exceeds \$5,994,000/FY24-25 and Subsequent Years*

Assumptions relative to public high schools:

- The proposed legislation creates a timeline for the implementation of computer science courses in LEAs servings students in grades 9-12 and public charter high schools.
- Each LEA serving students in grades 9-12 will be required to:
 - o In the 2021-22 school year, develop a computer science course and content plan that will be implemented by each high school;
 - o In the 2022-23 school year, offer at least one introductory computer science course in at least one high school;

- o In the 2023-24 school year, offer at least one introductory computer science course in at least 50 percent of the high schools; and
- o In the 2024-25 school year, offer at least one introductory computer science course in all of the high schools.
- Each public charter high school will be required to:
 - o In the 2021-22 school year, develop a computer science course and content plan to be implemented by the charter school; and
 - o In the 2022-23 school year, offer at least one introductory computer science course.
- In 2017, Public Chapter 105 required SBE to create an endorsement in computer science for all teachers who demonstrate sufficient content knowledge in the course material.
- Currently, Tennessee Tech University is the only approved teacher preparation provider in the state that offers programming specifically designed to train new teachers in computer science instruction.
- Of the 470 public high schools statewide, currently 296 do not offer a course that would satisfy the proposed computer science requirement and will be required to create a course.
- This analysis assumes:
 - o Each LEA currently provides a computer course in at least one school;
 - o Half of the public high schools, or 148 (296 x 50.0%) will offer a new course in FY23-24; and
 - The remaining 148 public high schools will implement computer courses in FY24-25.
- The new computer science courses will require an instructor who is endorsed in computer science.
- This analysis assumes:
 - O Approximately 75 percent, or 222 (296 x 75.0%), of applicable LEAs will hire additional part-time teachers to meet the instructional requirements;
 - o Half of, or 111 (222 x 50.0%), new teachers will be hired during FY22-23;
 - o The remaining 111 new teachers will be hired in FY23-24;
 - Approximately 25 percent, or 74 (296 x 25.0%), of applicable LEAs will recruit current teachers to receive endorsements to teach the required computer science courses;
 - o Half of, or 37 (74 x 50.0%), will receive an endorsement in FY22-23; and
 - o The remaining 37 teachers will receive an endorsement in FY23-24.
- Tennessee's average teacher salary is \$54,000 and one part-time computer science teacher is estimated to receive an average salary of \$27,000 (\$54,000 x 50.0%).
- It is estimated that hiring additional part time teachers will result in a recurring mandatory increase in local expenditures of \$2,997,000 (\$27,000 x 111) in FY22-23, and an increase of \$5,994,000 (\$27,000 x 222) in FY23-24 and subsequent years.
- The remaining 74 public high schools without computer science courses will recruit current teachers to obtain an endorsement in computer science to meet the instructional requirements.
- The amount of training required for such endorsement may vary from teacher to teacher.

- The average cost for a teacher to obtain an endorsement in computer science is estimated to be at least \$620 (\$500 training + \$120 exam); it is assumed that each school will pay for the cost incurred by teachers who get the endorsement.
- The mandatory increase in local expenditures is estimated to exceed \$22,940 (\$620 x 37) in each FY22-23 and FY23-24.
- It is unknown how many schools which do no not offer computer science courses will have sufficient technology resources to implement the required computer science course.
- It is estimated that equipment purchases will result in a one-time increase in local expenditures that exceeds \$100,000 statewide. These increases are estimated to occur in each FY22-23 and FY23-24.

Assumptions relative to grant programs:

- The proposed language establishes:
 - The CSG, which is available to provide one-time grants to LEAs and public charter high schools to assist in implementing a course and content plan during school years 2020-21 through 2024-25; and
 - o The CSPLG which is available to provide training and support to students and teachers in K-5 during school years 2020-21 through 2024-25.
- Individual grant awards will vary and cannot be determined; however, in order to establish such grant funds, it is reasonably assumed that a one-time increase in state expenditures exceeding \$4,000,000 in FY21-22 from the General Fund will be required to establish both funds.
- All funds will be expended from both the CSG and CSPLG by FY24-25; therefore, no funds will revert back to the General Fund.
- It is assumed that grants in excess of \$1,000,000 will be provided in each FY21-22 through FY24-25 to local governments.
- It is assumed that DOE will administer the grant program utilizing existing staff and resources.

Assumptions relative to total impact:

- For FY22-23, the total mandatory increase in local expenditures is estimated to exceed \$3,119,940 (\$2,997,000 teachers + \$22,940 endorsements + \$100,000 equipment).
- For FY23-24, the total mandatory increase in local expenditures is estimated to exceed \$6,116,940 (\$5,994,000 teachers + \$22,940 endorsements + \$100,000 equipment).
- For FY24-25 and subsequent years, the total mandatory increase in local expenditures is estimated to exceed \$5,994,000.
- A one-time increase in state expenditures from the General Fund in excess of \$4,000,000 will occur in FY21-22, with an equal, corresponding increase in state revenue of \$4,000,000 to the CSG and CSPLG Funds.
- An increase in state expenditures exceeding \$1,000,000 from the CSG and CSPLG Funds and an equal, corresponding increase in local government revenue exceeding \$1,000,000 in each FY21-22 through FY24-25.

*Article II, Section 24 of the Tennessee Constitution provides that: no law of general application shall impose increased expenditure requirements on cities or counties unless the General Assembly shall provide that the state share in the cost.

CERTIFICATION:

The information contained herein is true and correct to the best of my knowledge.

Krista Lee Carsner, Executive Director

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